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ABSTRACT

The errors on cloze tests completed by 22 German adults who spoke English and 40 American college students were analyzed to determine whether predictable error patterns occurred. The results indicated predictable error patterns at the independent, instructional, and frustration reading levels for all the adults. The error profiles of the two groups were similar, but the German adults made significantly fewer grammar errors than other types of errors at the independent and frustration levels. It appears that when the German subjects understood the passages they could put in words that made sense as often as the Americans did; but they left cloze items blank when they did not understand the material. When the error profiles of the adults in this study were compared to those profiles of children in a previous study, it appeared that some factor operating in the adults--perhaps their knowledge of language--allowed them to make a greater number of logical substitutions than the children did. (RL)

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Cloze Error Profiles of German and American Adults

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Many investigators (e.g., Propst, 1972) have discussed the problems with and the inappropriateness of standardized tests for ESL students. The primary solution to remediate some of these problems has been to locally norm the tests but Bladauf & Propst (1978) have found that this is too time consuming and expensive to be feasible. Thus, many ESL programs have turned to the cloze procedure and it has been gaining wide acceptance (Anderson, 1976; Elkins & Andrews, 1974; Kingston & Weaver, 1970).

Legenza & Elijah (1979) have developed a modification of the traditional cloze procedure which is especially applicable to the needs of ESL students. In their study they tested second and fourth grade students on traditionally constructed cloze tests and scored their performance as being at either the independent, instructional or frustration reading levels. They then analyzed each error

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(any word that was not an exact word replacement) and categorized it into one of four categories: Logical substitution (a meaningful substitution), Grammatical error (traditionally defined), Illogical substitution (a substitution which is not meaningful), or Blank response (an item left blank). They found that there were predictable error patterns at independent, instructional and frustration levels, with the key relationship between Logical and Illogical substitutions. Second and fourth graders reading at their independent level made significantly more Logical that Illogical substitutions, students reading at their frustration level made significantly more Illogical that Logical substitutions and there was no significant difference between Logical and Illogical substitutions at the instructional reading level.

Legenza & Elijah discussed one of the important potential uses of this predictable error pattern as being the more accurate placement of students in material by combining the error analysis with the use of traditional percentages. They also discussed using the error analysis as a diagnostic tool for remediation. These two uses of the error analysis seem especially applicable to the needs of ESL students.

As the Legenza & Elijah research was done with native English-speaking children, the purpose of this study was to determine if a predictable error pattern also occurs with adults and to compare the error profile of native English-speaking (American) adults with that of ESL (German) adults.

Method

Subject. The subjects were twenty-two German adults who spoke English and forty American adults enrolled in undergraduate Education courses

at Midwestern universities.

Procedure. The cloze tests were constructed with every fifth word deleted. The German adults were asked to complete a twenty-five item cloze test (in English) and the American adults were given a fifty item cloze test. Exact word replacement scoring was used and each passage was classified as being at either the independent reading level (58-100 percent correct), the instructional level (44-57 percent correct), or the frustration reading level (below 43 percent correct). Based on these criteria, at the independent level n=10 for Americans and n=5 for Germans; at the instructional level n= 16 for Americans and n= 4 for the Germans; at the frustration level n = 14 for Americans and n= 13 for the Germans.

Each incorrect substitution on the tests was analyzed and placed into one of four categories: 1) Logical substitution (meaningful substitutions which are both semantically and syntactically acceptable), 2) Grammatical error (errors which are not grammatically correct according to standard English in tense, number, or gender), 3) Illogical substitution (substitutions in which the semantic sense has not been preserved), or 4) Blank response (items to which the student does not respond).

Statistical Treatment. Two-way analyses of variance, reading level x error type, using a repeated measures design (Winer, 1971) were completed for the American and German passages. The Tukey (HSD) test was used to analyze pair means.

Results

Reading level effects were significant at the .001 level for both the Americans ($F(2,37)=110.75$) and the Germans ($F(2,19)=20.36$), an expected finding relating to the criteria concerning error rate for reading level group placement. (For the Americans, the mean

number of errors on the 50 item task was 19.00 at the independent level (n=14), 24.93 at the instructional level (n=16), and 30.35 at the frustration level (n=10). For the Germans, the mean number of errors on the 25 item task was 10.00 at the independent level (n=5), 12.75 at the instructional level (n=4), and 17.91 at the frustration level (n=13).)

Error type effects were significant at the .001 level for the Americans ($F(3,111)=143.88$) and at the .005 level for the Germans ($F(3,57)=5.87$). For the Americans, Tukey comparisons showed that at the independent level, subjects made significantly more ($p < .001$) Logical errors (mean = 13.70) than Illogical (mean = 3.60), Blank (mean = 1.10), or Grammar (mean = .60) errors; other comparisons were not significant. At the instructional level, American subjects made significantly more ($p < .001$) Logical errors (mean = 17.31) than Illogical (mean = 6.25), Blank (mean = .81), or Grammar (mean = .56) errors; the subjects also made significantly more ($p < .001$) Illogical errors than Blank or Grammar errors; the comparison of Blank versus Grammar errors was not significant. At the frustration level, American subjects made significantly more ($p < .001$) Logical errors (mean = 14.33) than Blank (mean = 3.57) or Grammar (mean = 1.21) errors; the subjects also made significantly more ($p < .001$) Illogical errors (mean = 11.14) than Blank or Grammar errors; the comparisons of Logical versus Illogical errors and Blank versus Grammar errors were not significant.

For the Germans, Tukey comparisons revealed the following significant differences: at the independent level there were more Logical errors than Grammar errors ($p < .05$) (means: Logical - 5.80; Blank - 2.60; Illogical - 1.40; Grammar - .20). At the frustration

level, there were more Blank errors than Grammar errors ($p < .005$), more Illogical errors that Grammar errors ($p < .05$), and more Logical errors than Grammar errors ($p < .05$) (means: Blank - 6.23; Illogical - 5.38; Logical - 4.92; Grammar - 1.38). Other Tukey pair comparisons for the independent and frustration levels were not significant. At the instructional level, the comparisons did not reveal significant differences (means: Logical - 5.25; Blank - 4.25; Illogical - 2.25; Grammar - 1.00).

Conversion of the error scores into percentages within each reading level provides dramatic information concerning the different error profiles. For example, for the Americans at the independent level, 72% of their errors were Logical, 19% were Illogical, 6% were Blank, and 3% were Grammar errors. However, for the Americans at the frustration level, 47% of their errors were Logical, 37% were Illogical, 12% were Blank, and 4% were Grammar errors. The instructional level had a relationship of Logical versus Illogical errors falling between the extremes of the independent and frustration levels (Logica : 69%; Illogical: 25%; Blank: 3%; Grammar: 2%).

For the Germans, the profiles were very similar to the Americans, except that the incidence of Blank errors was much greater at all reading levels (independent: 26%; instructional: 33%; frustration: 35%). At the independent level, 58% of the errors were Logical and 14% Illogical; at the instructional level, 41% of the errors were Logical and 18% were Illogical; at the frustration level, 27% of the errors were Logical and 30% were Illogical.

Discussion

Results indicated that there is a predictable error pattern between independent, instructional and frustration reading levels

for adults. Although the same differences were not significant for both American and English-speaking German adults, the profiles were very similar. The lack of as many significant findings with the German adults as compared with the Americans may be due to the small sample size. This aspect of the study should be replicated with a larger N and with other native languages to determine if the apparent finding of similar error profiles between American and German adults would be confirmed. It is especially interesting to note that the German adults made significantly fewer Grammar errors than other types at the independent and frustration levels. It appears that when they understood the passage they could put in words that made sense about as often as did the Americans. However, when they did not understand the material they left blanks.

Perhaps the most interesting finding was the difference in the error profiles of the adults in this study and the children in the previous Legenza and Elijah (1979) study. In both studies significantly more Logical than Illogical errors were obtained at the independent level; however, at the instructional level the adults again made more Logical than Illogical errors while the children made about equal amounts of both. Then, at the frustration level, the adults had about equal amounts of both types of errors (the same profile the children had at the instructional level) while the children made significantly more Illogical than Logical errors. Thus, it seems that there is some factor operating with adults, perhaps their knowledge of language, which allows them to put in Logical substitutions, while children are unable to. These results suggest the need to test children of all ages to obtain a developmental description of the cloze error profile.

References

Anderson, J. Psycholinguistic Experiments in Foreign Language Testing. Brisbane: University of Queensland Press, 1976.

Blaudauf, R.B.,Jr., & Propst, I.K.,Jr. Preliminary evidence regarding the validity of a modified cloze procedure for lower ESL students. Educational and Psychological Measurement, 1978, 38, 451-455.

Elkins, J. & Andrews, R.J. Manual for the St. Lucia Reading Comprehension Test. Brisbane: Teaching and Testing Resources, 1974.

Kingston, A.J. & Weaver, W.W. Feasibility of cloze techniques for teaching and evaluating culturally d advantaged beginning readers. Journal of Social Psychology, 1970, 82, 205-214.

Legenza, A. & Elijah, D. The cloze procedure: some new application The Journal of Educational Research, 1979, 72, 351-355.

Propst, I.K.,Jr. The inappropriateness of the use of U.S. standardized tests for non-native English speakers. American Samoa Department of Education Bulletin, 1972, 1, 1-6.

Winer, B.J. Statistical Principles in Experimental Design, 2nd edition. New York: McGraw-Hill, 1971.